# Five-Year Review Report

## Third Five-Year Review Report

For

## Colbert Landfill

Spokane County, Washington

August 2004

Prepared by:

Spokane County
Washington State Department of Ecology
Environmental Protection Agency, Region 10

Approved by:

Daniel D. Opalski, Director
Office of Environmental Cleanup

Date:

9/30/04

# Ecology Acceptance

## Third Five-Year Review

## Colbert Landfill

This signature sheet documents Washington State Department of Ecology's acceptance of the third Five-Year Review for the Colbert Landfill.

Michael Kuntz

**Michael Kuntz P.G., P.HG**
Senior Hydrogeologist
Toxics Cleanup Program, HQ
Washington State Department of Ecology

10-15-04

**Date**

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# Third Five-Year Review
# Colbert Landfill

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## Executive Summary

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Monitoring data from the Colbert Landfill area indicates a trend of declining contaminant concentrations. Treated groundwater from the facility has met effluent criteria and limits since facility startup. The residential monitoring program is ongoing for continued protection. Because the remedial actions and criteria at the Colbert Landfill site are protective, the site is protective of human health and environment.

## FIVE YEAR REVIEW SUMMARY FORM

### SITE IDENTIFICATION

**Site name *(from WasteLAN)*:** Colbert Landfill

**EPA ID *(from WasteLAN)*:** WAD980514541

| **Region:** 10 | **State:** WA | **City/County:** Colbert/Spokane |
|---|---|---|

### SITE STATUS

**NPL status:** Final Deleted Other (specify): Final

**Remediation status** (choose all that apply): Construction Complete / Operating

| **Multiple Ous?** NO | **Construction completion date:** 09/09/97 |
|---|---|

**Has site been put into reuse?** NO

### REVIEW STATUS

**Lead agency:** EPA State Tribe Other Federal Agency _State_____

**Author name:** Debra Geiger/Mike Kuntz/Neil Thompson

| **Author title:** Project Manager | **Author affiliation:** County/State/EPA |
|---|---|

**Review period:**** 06/01/04 to 09/24/04

**Date(s) of site inspection:** 09/24/04

**Type of review:** Post-SARA

**Review number:** 1 (first) 2 (second) 3 (third) Other (specify): __Third Five-Year Review_____

**Triggering action:** Previous Five-Year Review

**Triggering action date *(from WasteLAN)*:** _09/20/99__

**Due date *(five years after triggering action date)*:** 09/20/04

Five-Year Review Summary Form, continued.

**Issues:**

The new EPA constituent of concern, 1,4-dioxan, needs to be added to the data gathering for this site. 1,4-dioxan is associated with VOC contaminants that are found at this Site.

**Recommendations and Follow-up Actions:**

Recommend that EPA, Ecology, and the County together determine the best approach to gather the new 1,4-dioxan data. No other issues or actions were identified during this review.

**Protectiveness Statement:**

Because the remedial actions at this site are protective, the site is protective of human health and the environment.

**Other Comments:**

None

# Third Five-Year Review Report
# Colbert Landfill

## I. Introduction

The Washington State Department of Ecology (Ecology) and the Environmental Protection Agency, Region 10 (EPA), have conducted a Five-Year review of the remedial actions implemented at the Colbert Landfill (Site) located in Spokane County, Washington. This review was conducted from July through September 2004. This report documents the results of this sitewide review.

The purpose of the Five-Year Review is to determine whether the remedy at the Site has remained protective of human health and the environment. The methods, findings and conclusions of the review are documented in this report. In addition, any deficiencies and recommendations that were identified are described and have been reported to the responsible party.

Statutory Review

This is a Statutory Five-Year review. Statutory reviews are required for sites where hazardous substances, pollutants, or contaminants above levels that will not allow for unlimited use or unrestricted exposure will remain onsite even after the remedial action has been implemented. EPA must implement Five-Year reviews consistent with the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA) and the National Oil and Hazardous Substances Pollution Contingency Plan (NCP). CERCLA Section 121(c), as amended, states:

> *If the President selects a remedial action that results in any hazardous substances, pollutants, or contaminants remaining at the site, the President shall review such remedial action no less often than each five years after the initiation of such remedial action to assure that human health and the environment are being protected by the remedial action being implemented. In addition, if upon such review it is the judgement of the President that action is appropriate at such site in accordance with section [104] or [106], the President shall take or require such action. The President shall report to the Congress a list of facilities for which such review is required, the results of all such reviews, and any actions taken as a result of such reviews*.

The Agency interpreted this requirement further in the NCP; 40 CFR 300.430(f)(4)(ii) states:

> *If a remedial action is selected that results in hazardous substances, pollutants, or contaminants remaining at the site above levels that allow for unlimited use and unrestricted exposure, the lead agency shall review such action no less often than every five years after the initiation of the selected remedial action.*

This is the third Five-Year Review for Colbert Landfill. The trigger date for this site was the Second Five-Year Review. The initial Five-Year Review was done on July 13, 1994, just after the construction of the groundwater extraction and treatment system was completed. A second site inspection was done at the completion of the landfill cap and cover system on September 9, 1997. After this 1997 inspection and the acceptance of all deliverables required under the project consent decree, EPA turned the long-term operations and maintenance oversight over to Ecology. The Second Five- Year Review was completed on September 20, 1999.

While the landfill was operating, waste organic solvents were dumped into the landfill for disposal and migrated to the groundwater aquifers beneath the site. The remedial actions are to mitigate the contamination in the aquifers everywhere outside the landfill boundaries to concentrations below the drinking water criteria, thus allowing unrestricted use of the groundwater. The waste solvents found in the landfill waste were not found to be a continuing source and were contained within the closed and capped landfill.

## II. Site Chronology

Chronology of Site Events

| Event | Date |
|---|---|
| Initial Problem Identification | 4/24/80 |
| Final NPL Listing | 9/08/83 |
| Interim Remedial Measure (alternate water supply) | fall 1985 |
| RIFS Completed | 9/29/87 |
| ROD Signed | 9/29/87 |
| RD/RA Consent Decree (effective date) | 2/28/89 |
| RA Construction Started (monitoring wells) | 8/28/89 |
| Design Completed (extraction/treatment system) | 7/12/93 |
| Previous Five-Year Review (during construction period) | 7/13/94 |
| Construction Start (landfill closure) | 8/15/96 |
| Construction Completed (extraction/treatment system) | 2/13/97 |

| | |
|---|---|
| Construction Completed (landfill closure) | 5/31/97 |
| EPA Construction Closeout Report (PCOR) | 9/09/97 |
| Three of four south system wells placed on standby | 4/30/98 |
| Monitoring well sampling frequency reduced to annual | 8/31/99 |
| Second Five-Year Review | 9/20/99 |
| Fourth south system monitoring well placed on standby | 6/2/04 |

## III. Background

The Colbert Landfill Superfund site is a closed, 40-acre, municipal solid waste landfill located approximately 15 miles north of Spokane, Washington, and about 2.5 miles north of Colbert, Washington. The site is owned and was operated by Spokane County (County). The landfill operated from 1968 to 1986, when it became filled to capacity and was covered. In 1996 the landfill cover was upgraded and the landfill capped and closed to meet the new State of Washington regulations for solid waste units. The state landfill closure requirements meet the EPA hazardous waste closure requirements. The cap is a multi-layered, low permeable, cover system designed to reduce infiltration into the buried waste. The site is in a rural setting that is experiencing rural growth on 5-acre parcels. West of the landfill is a new city/county solid waste transfer facility.

Groundwater in the vicinity of the landfill is contaminated with chlorinated organic solvents. In 1983, 20 domestic wells were found to be contaminated above drinking water standards by contaminated groundwater. At least part of this contamination has been traced to spent solvents that were disposed of at the landfill. Solvents were reportedly disposed of at an average rate of several hundred gallons per month for a number of years, and primarily consisted of 1,1,1-trichloroethane (TCA) and methylene chloride (MC). Other organic solvents were also detected in groundwater near the landfill, including trichloroethylene (TCE), tetrachloroethylene (PCE), 1,1-dichloroethylene (DCE), and 1,1-dichloroethane (DCA). These six chlorinated organic solvents are referred to as the "Contaminants of Concern."

In 1980, nearby residents complained to the Eastern Regional Office of the Washington Department of Ecology (Ecology) about disposal practices at the landfill. The U.S. Environmental Protection Agency (EPA) and Ecology supported the Spokane County Utilities Department with an investigation into the citizen complaints and initiated a groundwater contamination study by sampling nearby private wells. The results of this initial sampling and investigation indicated that some private domestic wells were contaminated and an alternate drinking water source was suggested by the Spokane County Health District.

EPA and Ecology recommended the site for the National Priorities List (NPL) in 1982. In October 1983, EPA added the landfill to the NPL list.

## IV. Remedial Actions

Remedy Selection

The Spokane County Utilities Department began studies shortly after the identification of the contaminated groundwater problem in 1980. The initial studies were focused on determining the source of the contamination. Then in 1984 the remedial investigation (RI) was started to determine the nature and extent of the contamination under the direction of Ecology and EPA.

The RI data gathering process included the installation and sampling of 34 new groundwater monitoring wells and sampling over 50 private domestic wells around the site. Soil vapor and electromagnetic remote sensing technologies were also used to enhance the well data.

A Risk Assessment was done as a part of the study to evaluate the RI data in terms of risk to human health and the environment. Based upon the Risk Assessment, it was concluded that the most significant risks were from ingestion of (drinking) water from contaminated wells. TCA exceeded the Maximum Contaminant Level (MCL) of 200 mg/l for drinking water in several domestic wells. Concentrations of TCA in the aquifer were consistently around 2000 mg/l in several areas around the landfill.

Although the groundwater is contaminated, the health risks posed by eating crops irrigated by the contaminated groundwater were not considered significant, nor were ingestion of beef or dairy products coming from these irrigated fields. Even the inhalation exposure to volatile organics from showering did not present a public health risk. The depth to groundwater minimized any vapor intrusion issues. These risks have been even further reduced since groundwater treatment has occurred.

The discharge of treated groundwater is to the Little Spokane River. An analysis of the potential effluent was done as part of the NPDES substantive requirements evaluation to determine if discharge standards would be protective. The river has special phosphorous limitations that had to be met in addition to VOC loading.

All the data was evaluated for potential remedies in the site feasibility study (FS) completed in 1987. The RI/FS determined that the two primary aquifers in the landfill vicinity, and a low-productivity aquifer to the east of the landfill, are contaminated with some or all of the Contaminants of Concern. The FS recommended a pump and treat remedy to address this groundwater contamination.

On September 29, 1987, the Record of Decision (ROD) was signed by EPA requiring implementation of the following remedial actions:

- Prevent the further spread of contaminated groundwater towards the south and west from the landfill in the two aquifers by installing and operating interception wells and treating the extracted groundwater;

- Remove contaminated source materials from the groundwater to the east of the landfill which have entered the aquifers and are contributing to the contaminant plume, by installing and operating extraction wells in the area where the plumes originate and treating the effluent; and

- Provide an alternate water supply system to any residents whose domestic water supply has been effected by contamination from the landfill or by the action of the extraction systems,

- Close the landfill to comply with the Ecology landfill closure regulations.

Three of the four identified Potentially Responsible Parties (PRPs) agreed to implement the ROD and signed a Consent Decree along with EPA and Ecology which was entered on February 28, 1989. The County agreed to take the lead on performing the remedial actions with the others providing financial support. The fourth PRP, which did not sign the Consent Decree, did settle with EPA at a later date.

Remedial Construction Activities

The construction activities related to the remedial actions were all completed by Spokane County Utilities Department through County awarded contracts. The County hired an engineering firm to design and then provided construction management for the construction contracts. County engineering staff was in charge of the project and provided oversight of the construction contractors.

The remedial construction actions were divided into three separate projects: an initial Remedial Measure (IRM); installation of the groundwater extraction and treatment system; and landfill closure.

The IRM was the construction of an alternate water supply system to the affected area. This action was designed and constructed before the RI was completed. It consisted of the extension of a municipal (Whitworth Water District #8) supply system. Construction was started in the fall of 1984 and completed in the fall of 1985. The county connected 23 residences with contaminated wells to the new alternate water supply. The supply system was designed to serve the whole area as the needs arose. Since 1985, a few

additional new residences have been added to the water system because of their proximity to the contaminated groundwater plume.

The extraction and treatment system consists of 10 extraction wells, the necessary pumps, piping, and controls, and the air-stripping treatment facility with its discharge of treated water to the Little Spokane River.

The landfill closure was designed and constructed after the extraction and treatment system was complete to allow for access to the landfill area if needed for this system and to allow for changes in the state closure requirements to become finalized prior to design. The new landfill closure requirements were finalized after the ROD was signed and it was important to incorporate the new requirements since they were significantly more stringent that the previous ones and were consistent with the EPA RCRA Subtitle D landfill closure requirements.

The original cost estimate to implement the remedial actions described in the ROD was about $14 million. The cost estimates were developed for various alternatives in the FS. Because the selected remedy was a pump and treatment project, the remedial action costs were projected for 30 years of operations and maintenance.

The actual costs for construction of the extraction and treatment system exceeded the original estimates for construction primarily because additional aquifer and plume definition were required before placement of the extraction well systems. An additional 30 monitoring wells at 19 locations were needed because the RI data was inadequate to design the selected remedial action.

The design and construction, including a pilot treatment plant, took about four years to complete. The final start-up of the treatment facility was only about four months later than was scheduled in the original design/construction work plan. The pump and treatment system was substantially complete on May 3, 1994.

The EPA project manager did a pre-final construction completion inspection of the treatment facility and extraction wells on July 13, 1994. Punch list items were related to the computerized controls and wireless telemetry that would make the operation of the system less labor intensive. It took almost a year, February 22, 1995, to debug the electronics and have them accepted by the County.

The following is a summary of the construction events for the extraction and treatment facility phase of the project:

- Fall 1984 to Fall 1985 - Design and construction of the pipeline extension to bring the alternate water supply into the residential area around the landfill.

- March 23, 1989 - County signed the design contract.

- August 8, 1989 - Contract awarded to construct monitoring and extraction wells to be used both for the pilot treatment studies and the final pump and treat.

- 1990-1991 - Construction of the 30 new monitoring wells, the 4 extraction wells to be used for the pilot tests, the effluent discharge line to the Little Spokane River, and a meteorological station. The pilot tests were completed during the spring of 1990.

- December 1991 - Final Phase l Engineering Report providing results of the pilot air stripping tower and groundwater treatability studies.

- March 1992 - Preliminary Treatment and Discharge Plan, Phase ll Remedial Design/Remedial Action Plan.

- July 12, 1993 - Approval of the Plans and Technical Specifications for bid.

- September 1993 - Construction of the air-stripping towers, treatment building and extraction system began.

- May 3, 1994 - County accepted pump and treatment facility as functionally complete.

- July 13, 1994 - EPA performed a Pre-Final Close Out Inspection site inspection of the extraction and treatment systems.

- February 22, 1995 - Spokane County fully accepted the treatment facility and extraction well system.

The remedial construction activities consisted of installing monitoring wells, extraction wells, and air-stripping treatment facility, and over four miles of piping conveyance to bring the extracted contaminated groundwater into the air-stripping unit for treatment and then discharge to the Little Spokane River.

A pilot treatment system was constructed and tested in two locations to obtain design data for the design and construction of the air-stripping tower and treatment facility. Although the pilot tests were just satisfactory, they did provide the necessary design data fort the treatment facility.

Treated groundwater discharges easily meet the effluent limits for the Contaminants of Concern and other National Pollution Discharge Elimination System NPDES) substantive requirements. There have been no violations of the effluent limits since the treatment plant came on-line. Treated discharge data is being collected as part of the NPDES requirements.

The third phase of construction for this project was the upgraded closure of the landfill. When the landfill was filled to capacity and waste no longer accepted, clean cover soils were placed over the waste units. It was agreed in the ROD that the County would upgrade the cover to meet all of the revised landfill closure requirements that were under review at that time.

The following is a listing of some of the important actions that lead to landfill closure:

- Summer 1986 - The landfill was filled to capacity and closed for the disposal of further waste material.

- Summer 1986 - A minimum of two feet of clean cover material (soil) was placed over the buried waste units. The site was surveyed to insure that there was at least two feet of clean cover over the entire site for compliance with the operating permit. At the time the ROD was written, this was the state requirement for landfill closure.

- August 29, 1995 - Contracted for design of the landfill cap to be consistent with current state and federal closure regulations.

- April 15, 1996 - Notice to Proceed for construction of the landfill closure.

- August 1996 - Construction essentially complete for all of the work elements.

- April 3, 1996 - Preliminary Closeout site inspection of landfill closure by Ecology and EPA.

- May 31, 1997 - Construction fulfilled. All of the punch-list items were completed. Remedial actions fully operational and functional.

System Operations/Operations and Maintenance (O&M)

The County hired and trained a system operator to run the extraction and treatment systems. She was in-place before the completion of construction and was trained during startup of the system. The County also hired and trained staff to perform the groundwater sampling which is a required part of the system performance and compliance monitoring.

The County's Project Manager and staff have a solid command of the treatment needs, processes, and functions of the overall pump and treat system for groundwater contamination control and cleanup.

Original operations and maintenance costs were estimated to be approximately $300,000 per year. Actual O&M costs over the last five years have ranged from approximately $350,000 to $390,000 per year with no large variations in specific budget areas.

## V. Progress since the Last Five-Year Review

There were no actions or recommendations included in the last five year review. The Second Five-Year Review stated, “The cleanup goals for the groundwater that were established in the ROD are still considered protective of human health and the environment and the remedial actions for this site were protective when constructed and continue to remain protective.”

There were a few actions the County has taken since the last review. The concentrations of groundwater contaminants reaching the extraction wells in the South Extraction System has decreased sufficiently to allow all four extraction wells to be converted to monitoring wells and still maintain the required groundwater quality in the Upper Aquifer south of these hydraulic barrier control wells. At the time of this review, six of the original 10 extraction wells are delivering contaminated groundwater to the treatment facility. Operating efficiency has been improved by some minor modifications at the facility. This included programming changes to the telemetry system and installing a fan motor that is compatible with the in-place variable frequency drive extraction pumps. With a decrease in overall influent flow, the new motor enables the operator to keep the air to water ratio constant by running the fan at lower speeds and thereby reducing electricity demands.

## VI. Five-Year Review Process

Community Involvement

A public notification was published on September 15, 2004, by the local newspaper, *The Spoksman Review*, that a five-year review was being conducted and comments were solicited. No comments have been received from this announcement.

Document Review

Relevant documents were reviewed including operations and maintenance plans and records, monitoring data, quarterly progress reports, and the project consent decree.

Data Review

The review included the monitoring data generated from the Site monitoring program. Monthly and quarterly data on water quality provide the project managers with checks on whether the extraction and treatment system was providing the hydraulic barrier for the Upper Aquifer at the South Extraction Wells and source control in the Lower Aquifer (East and West Extraction System) as expected. With over ten years of data available on the aquifer water quality and on the performance of the treatment system, reliability and trends can be established. The active extraction and treatment system is performing within the design parameters and there have been no problems meeting the effluent discharge requirements established for the Site treatment system for discharge to the Little Spokane River. Data also indicates that the contaminant concentrations in the aquifers are decreasing steadily (See Appendix Figures A-1 through A-4 and Tables A-1 through A-4). The overall size and shape of the contaminated groundwater plume has not changed significantly, but active pumping has reduced the concentrations, especially in the Lower Aquifer.

Figures A-1 and A-2 represent the Upper Aquifer. Over the last 10 years of groundwater monitoring and controls, the plume has not spread further south. The contaminant concentrations have decreased which has allowed the South Extraction Wells to be placed on standby (not pumping) and still meet the cleanup goals for the Upper Aquifer. The South System was installed to prevent the plume from migrating further south and impacting more area.

Figures A-3 and A-4 represent the Lower Aquifer. Extraction wells are still pumping contaminated groundwater from the Lower Aquifer to the treatment system. The pumping has decreased the size of the area exceeding the cleanup performance standard established for this Site.

The operations staff has tremendous knowledge about the working and functions of the project from water quality monitoring to maintenance of the treatment system. The staff has diagnosed problems and made improvements and fixes to various parts of the system as they arose. This trained staff is proving to be an asset to the County as it closes other County landfills. Having the operators respond to system glitches 24-hours-per day-seems to be a great incentive to solving the cause of problems not just re-starting or patching the effects.

Site Visit and Inspection

The site is inspected monthly by the operating staff. A Five-Year Review site visit and inspection was performed on September 24, 2004, by County personnel. The Five-Year Review Site Inspection Checklist is included as an Attachment to this report.

## VII. Technical Assessment

*Question A: Is the remedy functioning as intended by the decision documents?*

Yes: This project is working as designed and continuing to provide protection to users of this groundwater resource. The groundwater monitoring is providing data that concludes the systems are working. The overall area of detected contamination in the two aquifers remains about the same, but the overall concentrations of contaminants in the groundwater are decreasing, and the plume size above the cleanup levels is shrinking (see plume coverage in Figures A-1 through A-4 in the Appendix). Constituents of concern concentrations arriving at the facility via the influent have continued to decrease (see Figure A-5). A total of 9,450 pounds of constituents of concern have been removed from influent since facility startup (see Figure A-6). The treatment system meets the substantive requirements of the NPDES for discharge into the Little Spokane River. The municipal water supply system has been able to expand to provide potable water to any new residents that moved into the area. The County has been able to keep new wells from being constructed over the plume. The landfill cover system has been operating effectively and the County is in compliance with Ecology landfill closure requirements. Pumps, wells, and landfill cover all need occasional service, but this has been within the normal expected O&M activities. The air discharges from the treatment system and the landfill gas emissions continue to meet the air emission requirements. The remedial actions remain protective of human health and the environment.

System operations as currently implemented will continue to deliver the effectiveness of the remedy. Opportunities for reduction in costs may include further monitoring frequency reductions (as provided for in Sections V.A.2.a and V.C.2.b of the consent decree), however, the savings in cost for this alone would be minimal. Some cost reductions have already been implemented through minor facility equipment and software changes.

*Question B: Are the exposure assumptions, toxicity data, cleanup levels, and remedial action objectives (RAOs) used at the time of the remedy still valid?*

Yes. Constituents of concern concentrations in the aquifer(s) continue to decrease. The current levels in areas where residential wells are being used are well below clean-up criteria or not detected (See domestic well monitoring data in Table A-4 in Appendix). There appears to be no changes in concentrations or analytes present to warrant

reassessment of exposure. There has been housing development growth in the area near the south system extraction wells that includes the use of septic tanks and drainfields. This development could have a possible impact on area water quality in the Upper Aquifer but is not thought to impact the current extraction and treatment system.

Since the Second Five-Year Review, a new constituent of concern has emerged; 1,4-dioxan. This VOC is found in association with TCA. 1,4-dioxan is a suspected human carcinogen and may be found at the Site. Sampling for this contaminant needs to be done to determine if it is present at the Site. If found, an evaluation of the risk should be done to insure that the remedy and remedial actions continue to be protective.

*Question C: Has any other information come to light that could call into question the protectiveness of the remedy?*

No. There are no changes in Site conditions that would affect the protectiveness of the remedy. The plumes are not expanding and contamination is being removed as anticipated.

Technical Assessment Summary

According to data review and the site inspection, the remedy is functioning as intended by the ROD and the Site consent decree. No physical site changes have occurred that would affect the remedy. Some equipment and software modifications have been completed to increase system efficiency and aid in reducing costs.

Active Site management is implementing the institutional controls (ICs) that are stated in the EPA ROD. The groundwater monitoring is adequate to determine if there are any impacts to the aquifers by water withdrawals that could affect the plume migration. New residential development in the area is being connected to a municipal water supply rather than installing new residential wells in a contaminated aquifer. This is being done by actively working with the building permits department since there is no legal requirement for connecting to the water system over installing a drinking water well. The required deed notation for the closed landfill has been completed and is filed with the county. Major issues concerning the contaminated groundwater plume migration away from the extraction wells might occur if new large irrigation wells were constructed near the Site. The existing irrigation wells have not had an impact, and development is trending towards smaller tracts rather than larger farms. The other IC that was in the ROD was for water replacement if the Site's groundwater extraction system rendered any existing well usage unusable. This has not occurred.

There has been no specific interest in reuse of this site. The Site is located in a rural setting with undeveloped land available. The landfill cap and cover system was not designed nor constructed to support any specific reuse. Currently access to the Site is restricted and it remains as open space.

## VIII. Issues

No specific O&M issues were noted during the file review or during the site inspection. The "Five-Year Review Site Inspection Checklist" is attached with the results of the site inspection. The sampling of the groundwater for 1,4-dioxan is a new concern that needs to be added to the Sample Plan.

## IX. Recommendations and Required Actions

The request for analyzing for the constituent, 1,4-dioxan, to the data gathered from the Site is new. The changes needed in the Sample Plan will be discussed among the County, Ecology, and EPA to obtain this data. No other specific actions for improvements or changes are being forwarded to the PRPs based on this Five-Year Review.

## X. Protectiveness Statement

Because the remedial actions at this site are protective, the site is protective of human health and the environment.

## XI. Next Review

The next, Fourth Five-Year Review is to be conducted within the next five years, but not later than September 20, 2009.